

an ounce separated by standing. The silver coins were also highly corroded by sulphur, particularly where in contact with a German silver piece and a couple of small notes, at that time so common, and known by the vulgar but now almost historical name of shin-plasters.

Stated Meeting, April 15.

Present, twenty-three members.

JUDGE KANE, Vice-President, in the Chair.

Letters were read:—

From A. L. Crelle, dated Berlin, 22d March, 1853, acknowledging the receipt of notice of his election as a member of the Society:—

From the Royal Danish Society of Sciences, dated Copenhagen, 27th Sept. 1852, accompanying a donation for the Library:—

From Lieut. J. M. Gilliss, dated Washington, 6th April, 1853, announcing a donation for the Library, made at his request, by the Council of the University of Chile.

The following donations were announced:—

FOR THE LIBRARY.

Archives du Muséum d'Histoire Naturelle: Tome VI. livr. 3, 4. Paris, 1852. 4to.—*From the Professors of the Museum.*

Det Kongelige Danske Videnskabernes Selskabs Skrifter. Femte Række. Historisk og Philosophisk Afdeling. Første Bind. 1852. Kiøbenhavn. 4to.—*From the Royal Danish Society of Sciences.*

Anales de la Universidad de Chile, correspondientes a los años 1843, hasta 1852. Santiago de Chile. 8vo.—*From the University of Chile.*

Transactions of the Royal Irish Academy. Vol. XXII. Part 3, Science: Part 4, Polite Literature. 1852-3. Dublin. 4to.—*From the Academy.*

Proceedings of the Royal Irish Academy, for the year 1851-2. Vol. V. Part 2. Dublin. 8vo.—*From the same.*

Journal of the Boston Society of Natural History; June, 1852. Boston. 8vo.—*From the Society.*

- Proceedings of the Academy of Natural Sciences of Philadelphia:
Vol. VI. No. 7. Jan. and Feb. 1853. Philadelphia. 8vo.—
From the Academy.
- Proceedings of the New Jersey Historical Society: Vol. V. No. 4.
Newark, 1853. 8vo.—*From the Society.*
- Journal of the Franklin Institute. 3d Series. Vol. XXV. No. 4.
April, 1853. Philadelphia. 8vo.—*From the Institute.*
- The African Repository. Vol. XXIX. Nos. 1, 2, 3. Jan. Feb. March,
1853. Washington. 8vo.—*From the American Colonization
Society.*
- The American Journal of the Medical Sciences. No. L. New Se-
ries. April, 1853. Philadelphia. 8vo.—*From Dr. Isaac Hays,
Editor.*
- The Medical Examiner and Record of Medical Science. New Series.
Vol. VIII. Nos. 8 to 12: Vol. IX. Nos. 1 to 4. Philadelphia,
1852-3. 8vo.—*From Dr. F. G. Smith, Editor.*
- The Medical News and Library: Vol. XI. No. 124. April, 1853.
Philadelphia. 8vo.—*From Blanchard & Lea.*
- The Astronomical Journal. No. 55. (Vol. III. No. 7), March 28,
1853. Cambridge. 4to.—*From Dr. B. A. Gould, jr., Editor.*
- The Plough, the Loom and the Anvil. Vol. V. No. 4. April, 1853.
New York and Philadelphia. 8vo.—*From F. G. Skinner, Edi-
tor.*
- Thirty-fourth Annual Report of the Controllers of the Public Schools
of the City and County of Philadelphia, for the year ending June
30, 1852. Philadelphia. 8vo.—*Donor unknown.*

FOR THE CABINET.

- Specimens of Petrified Wood, altered by the heat of the conflagration
at Barnum's Museum, in Philadelphia, Jan. 2, 1852: and
An Indian Arrow from Oregon.—*From Dr. Franklin Stewart.*

Dr. Boyé referred to his communication to the Society at its last meeting in regard to the decay of the articles deposited in the corner stone of the High School. He stated, that at the request of the Committee of the Controllers on Property, he had given the subject a further careful examination, and he is now satisfied, that the water must have got in from the outside by infiltration, first through the mortar into the cavity, and afterwards from this through the sealing wax, with which the glass stopper was secured. The corner stone formed the lowermost north-west stone of the foundation of the main

building, and consisted of a block of blue marble, in which a rectangular excavation had been made, which was closed on top by a marble slab sunk down into the stone, and secured by common mortar. The papers and coins had been deposited in a half gallon wide-mouthed glass jar with glass stopper, secured by ordinary sealing wax, and the jar laid down in a horizontal position, in direct contact with the bottom of the cavity. When opened, the cavity itself contained no water. The reasons which induce him to suppose that the water found its way in from the outside at an early period, either during or soon after the erection of the building, but subsequently again evaporated from the cavity in the stone, are:—1. Though the marble slab seems to have been well secured, there are evident signs of a gradual infiltration on all sides of the cavity, but particularly on one from a calcareous film deposited on it, most observable in the bottom of the chisel-grooves. 2. A thin white film of carbonate of lime deposited externally on one side of the jar, indicating a distinct water line. No such water line, however, was perceptible in the cavity of the stone, seeming to indicate that the infiltration and subsequent evaporation had been gradual, and the jar floating. 3. The entire decolorization and corrosion of the sealing wax outside the stopper, causing it to be loose and friable. This action is ascribed to the lime of the water. A portion of the sealing wax, which, during the sealing, had run into the jar and yet adhered to the stopper, was discolored on the outer surface, but perfectly fresh inside, and was found to consist of nothing but the ordinary resinous matters and vermilion (sulphuret of mercury), without oxide of lead or earthy matters. That outside left by incineration a little more ash, which effervesced with acids. 4. Traces of a thin layer of sealing wax having been secured in the molten state between the stopper and the neck of the jar, and of its subsequent removal by the infiltration, so that the stopper now fits further in the neck than when the jar was in the cavity. This is known by corresponding stains on both the ground surfaces of the joint. The water in the jar became almost entirely absorbed by the removal of the papers from it. What was left of it, would not filter clear, it had a feeble alkaline reaction on litmus, contained only traces of sulphuric acid and lime, did not blacken metallic silver, [the jar was not opened or examined till about ten days after its removal,] yielded at first no precipitate with nitrate of silver, but after some time a dark brown, and the solution assumed a dark blood red colour. The corrosion of the coins was therefore mainly ascribed to the sulphur in the glue or

sizing in the paper. The inside of the jar, where in contact with the papers, was also stained by a black film of sulphuret of lead from the oxide of lead contained in the glass.

The Society then proceeded to the stated business of the meeting, the balloting for candidates for membership.

All other business having been concluded, the ballot boxes were opened, and the following named gentlemen were declared, by the presiding officer, to be duly elected members of the Society.

THOMAS L. PATTERSON, Chief Engineer of the Chesapeake and Ohio Canal.

HENRY GRINNELL, of New York.

JOHN B. BIDDLE, M.D., of Philadelphia.

Stated Meeting, May 6.

Present, nine members.

JUDGE KANE, Vice-President, in the Chair.

Letters were read:—

From Henry Grinnell, dated New York, 19th April, 1853:—
and from Dr. John B. Biddle, dated Philadelphia, 22d April, 1853,—severally acknowledging the receipt of notice of their election as members:—

From the Imperial Academy of Sciences at Vienna, dated 7th October, 1852, returning thanks for No. 47 of the Proceedings of this Society:—

From the Royal Prussian Academy of Sciences, dated Berlin, 11th November, 1852, accompanying a donation for the Library: and—

Copy of a letter from Dr. J. G. Grunert, Professor of Mathematics in the University of Greifswald, to Dr. J. G. Flügel, of Leipsic, dated Greifswald, 4th January, 1853, on transmitting to him two copies of a work written by Dr. Grunert, and requesting Dr. Flügel to present one of them to this Society.